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Control number Substitute for form 1449A/PTO <b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b> <i>(use as many sheets as necessary)</i>				<b>Complete if Known</b>	
				Application Number	
				Filing Date 10-29-2001	
				First Named Inventor Yingjian Wang	
				Art Unit	
				Examiner Name	
Sheet	1	of	5	Attorney Docket Number	

U.S. PATENT DOCUMENTS					
Examiner Initials	Cite No. 1	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number - Kind Code 2 (if known)			
		US- US- 5,143,854	09-01-1992	Pirrung, et al.	
		US- US- Described method of making ordered arrays of nucleic acid sequences.			
		US- US- 5,283,173	02-01-1994	Fields and Song	
		US- US- Described an in vivo genetic method (yeast two-hybrid screening) US- to study protein-protein interactions.			
		US- US- 5,807,522	09-15-1998	Brown, et al.	
		US- US- Disclosed a method and apparatus for forming microarrays of US- biological samples and for distribution of biological reagents to researchers US- through DNA array. The method involves dispensing a known volume of a US- reagent at each selected array position, by tapping a capillary dispenser on US- the support under conditions effective to draw a defined volume of liquid US- onto the support.			
		US- US-			

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\*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

1 Applicant's unique citation designation number (optional). <sup>2</sup> See Kinds Codes of USPTO Patent Documents at [www.uspto.gov](http://www.uspto.gov) or MPEP 901.04. <sup>3</sup> Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). <sup>4</sup> For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. <sup>5</sup> Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. <sup>6</sup> Applicant is to place a check mark here if English language Translation is attached.

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OTHER PRIOR ART – NON PATENT LITERATURE DOCUMENTS			
Examiner Initials	Cite No. <sup>1</sup>	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published	T <sup>2</sup>
		<p>BIGGIN, M.D. (1999) Ultraviolet-cross-linking-assay-to-measure-sequence-specific DNA binding in vivo. <i>Methods Enzymol.</i> 304, 496-515. Described the applications of Cross-linking, including in studying protein-protein interactions, protein-DNA interactions.</p> <p>BULYK ML, GENTALEN E, LOCKHART DJ, CHURCH GM (1999) Quantifying DNA-protein interactions by double-stranded DNA arrays. <i>Nature Biotechnology</i>, 17:573-577. Described methods of using arrays of nucleic acids to detect DNA-protein interactions.</p> <p>DERISI J, PENLAND L, BROWN PO, BITTNER ML, MELTZER PS, RAY M, CHEN Y, SU YA, TRENT JM (1996) Use of a cDNA microarray to analyse gene expression patterns in human cancer. <i>Nature Genetics</i> 14:457-460. Described methods of using arrays of nucleic acids for large scale hybridization assays, including monitoring of gene expression</p> <p>FIELDS AND SONG, A novel genetic system to detect protein-protein interactions. 1989, <i>Nature</i>, 340:245-246. Describe a new method of Yeast two-hybrid screening for detecting protein-protein interactions.</p>	

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		<p>FODOR SP, READ JL, PIRRUNG MC, STRYER L, LU AT, SOLAS D. (1991) Light-directed, spatially addressable parallel chemical synthesis. <i>Science</i>, 251: 767-773.</p> <p>Described an alternate method of creating ordered arrays of nucleic acid sequences. The method involves synthesizing different nucleic acid sequences at different discrete regions of a support, usually made of glass.</p> <p>GE, H. (2000) UPA, a universal protein array system for quantitative detection of protein-protein, protein-DNA, protein-RNA and protein-ligand interactions. <i>Nucleic Acids Research</i>, Vol. 28:e3.</p> <p>Describe the protein arrays and some of the applications.</p> <p>HACIA JG (1999) Resequencing and mutational analysis using oligonucleotide microarrays. <i>Nat Genet.</i> 21(1 Suppl):42-7.</p> <p>Described methods of using DNA arrays to get nucleotide sequence information, including mutation detection, polymorphism detection and DNA sequencing</p> <p>KONONEN J, BUBENDORF L, KALLIONIEMI A, BARLUND M, SCHRAML P, LEIGHTON S, TORHORST J, MIHATSCH MJ, SAUTER G, KALLIONIEMI OP (1998) Tissue microarrays for high-throughput molecular profiling of tumor specimens. <i>Nature Medicine</i>, 4:844-7.</p> <p>Described methods of using of tissue arrays in tumor screening.</p>	

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		<p>PHIZICKY, AND, FIELDS, Protein-protein interactions: methods for detection and analysis. Microbiological Reviews, p94-123, Mar. 1995 Reviewed several methods for detecting protein-protein interactions.</p> <p>PRUSS, GAVIN, MELNIK AND BAVYKIN. DNA-protein cross-linking applications for chromatin studies in vitro and n vivo. Methods Enzymol.; 304, 516-533, 1999) Described the applications of Cross-linking, including in studying protein-protein interactions, protein-DNA interactions.</p> <p>SACHS, SCHECHTER, EASTLAKE AND ANFINSEN. Inactivation of staphylococcal nuclease by the binding of antibodies to a distinct antigenic determinant. Biochemistry 1972; 11(23): 4268-73. Discussed the interactions between antibodies and antigens.</p> <p>SCHENA M, SHALON D, DAVIS RW, BROWN PO (1995) Quantitative monitoring of gene expression patterns with a complementary DNA microarray. Science 270:467-470. Described methods of using arrays of nucleic acids for the monitoring of gene expressions.</p> <p>SMITH, Filamentous fusion phage: novel expression vectors that display cloned antigens on the virion surface. 1985, Science 228:1315-1317. Described the method of Phage display for screening protein-protein interactions.</p>	

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		<p>SOUTHERN EM, MASKOS U, ELDER JK (1992) Analyzing and comparing nucleic acid sequences by hybridization to arrays of oligonucleotides: evaluation using experimental models. <i>Genomics</i> 13:1008-1017.</p> <p>Described a related method to create arrays of nucleic acids by parallel synthesis.</p> <p>WANG, Y., WU, T.R., CAI, S., WELTE, T., AND CHIN, Y.E. (2000) Stat1 as a component of tumor necrosis factor alpha receptor 1-TRADD signaling complex to inhibit NF-kappaB activation. <i>Mol. Cell Biol.</i> 20(13), 4505-12.</p> <p>Describe the use of antibody arrays in screening protein-protein interactions.</p> <p>WONG, SHAN S. (1993) Chemistry of protein conjugation and cross-linking. Boca Raton: CRC Press.</p> <p>Describe a variety of cross-linkers and a variety of methods to cross-link proteins.</p>	

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